

Chronic HIV Care *with* ARV Therapy

**INTEGRATED
MANAGEMENT OF
ADOLESCENT AND ADULT
ILLNESS**

**INTERIM GUIDELINES FOR
FIRST-LEVEL FACILITY HEALTH WORKERS**



World Health Organization



This is one of 4 IMAI modules relevant for HIV care:

- ❖ Acute Care
- ❖ Chronic HIV Care with ARV Therapy
- ❖ General Principles of Good Chronic Care
- ❖ Palliative Care: Symptom Management and End-of-Life Care

These are interim guidelines released for country adaptation and use to help with the emergency scale-up of antiretroviral therapy (ART) in resource-limited settings. These interim guidelines will be revised soon based on early implementation experience. Please send comments and suggestions to : imaimail@who.int.

The IMAI guidelines are aimed at first-level facility health workers and lay providers in low-resource settings. These health workers and lay providers may be working in a health centre or as part of a clinical team at the district clinic. The clinical guidelines have been simplified and systematized so that they can be used by nurses, clinical aids, and other multi-purpose health workers, working in good communication with a supervising MD/MO at the district clinic. The adherence, education and psychosocial support guidelines are aimed at delivery by lay providers or health workers after training in counselling skills. This module is designed to be used both as learning aid (during training) and as a job aid.

This module cross-references the IMAI **Acute Care** guidelines (which includes management of opportunistic infections and when to suspect TB and HIV) and **Palliative Care: Symptom Management and End-of-Life Care**. If these are not available, national guidelines for the acute care of adults and palliative care can be substituted.

Integrated Management of Adolescent and Adult Illness (IMAI) is a multi-departmental project in WHO producing guidelines and training materials for first-level facility health workers in low-resource settings.

WHO IMAI Project

Use the General Principles of Good Chronic Care

See IMAI module with this title for more detail

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Chronic care based at the primary care facility near the patient's home

CLINICAL TEAM ROLES AND RELATIONSHIPS

First-level facility health workers or health workers/ lay staff at district clinic

- ❖ Suspect HIV, test and counsel
- ❖ Begin HIV chronic care including education, support, prophylaxis
- ❖ HIV clinical staging
- ❖ Check TB status
- ❖ Check pregnancy status
- ❖ Assess eligibility for ART
- ❖ Treat OIs, other complications
- ❖ Adherence preparation and support
- ❖ Health worker initiates first-line ART regimens in patients without complicating conditions with supervision by district clinician (MD/MO)
- ❖ Clinical monitoring
- ❖ Respond to new signs and symptoms on ART
- ❖ Dispense medications
- ❖ Arrange follow-up
- ❖ Preventive interventions

Clinicians at district clinic/hospital

- ❖ Develop Treatment Plan for certain patients
- ❖ Initiate ART in patients with complications
- ❖ Supervise clinical team(s) at first-level facility
- ❖ Supervise ART delivered at first-level facility
- ❖ Manage severe side effects and toxicity
- ❖ Follow-up with lab, monitoring when needed
- ❖ Evaluate for treatment failure
- ❖ Manage severe illness
- ❖ Hospital care as needed

Consult/refer for certain patients

Treatment Plan for complicated patients

Refer back for scheduled follow-up for certain patients; for poor control on Treatment Plan; for severe toxicity or illness

Good communication

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11. Prevention for PLHA

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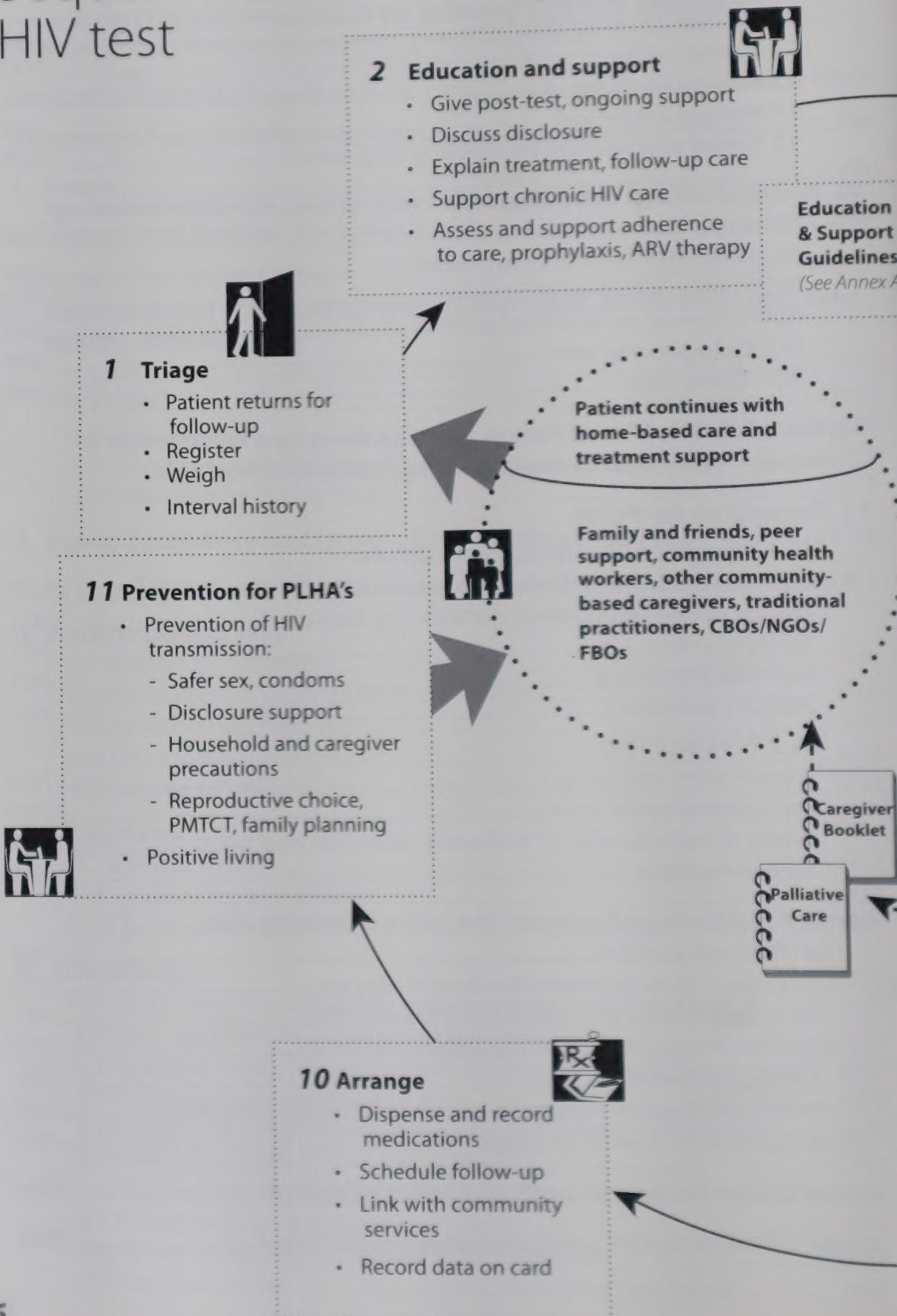
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Sequence of care after positive HIV test



If health worker visit needed:

3 Assess

- Do clinical review of symptoms and signs, medication use, side effects
- Determine HIV clinical stage and functional status
- Assess adherence to medications (use counsellor's assessment and your own)



4 Review pregnancy and family planning status in all fertile women on each visit



If pregnant

Antenatal care with PMTCT interventions

5 Review TB status in all patients on each visit



cccc TB Care

6 Provide clinical care

- Use Acute Care guidelines to manage new signs and symptoms

For all, manage symptoms.



7 Give prophylaxis if indicated



8 ARV therapy

- Decide if eligible and where to initiate
- Consult/refer to district clinician per guidelines
- Do clinical monitoring of ARV therapy
- Support adherence



9 Manage chronic problems



Consult or send to District Clinician indicated



1 Triage

- ❖ Greet the patient
- ❖ Register if new patient
- ❖ If follow-up, retrieve records
- ❖ Weigh
- ❖ Determine reason for visit
- ❖ Take interval history
- ❖ Decide if patient needs to see health worker on this visit

Patient should see the health worker if scheduled for clinical visit or if any new symptom except for simple nausea or, in patient at the beginning of efavirenz (EFV) treatment, simple dizziness.

2 Educate and support the patient on each visit

- ❖ Give post-test, ongoing support
- ❖ Discuss disclosure
- ❖ Explain treatment, follow-up care
- ❖ Initiate then support chronic HIV care
- ❖ Assess & support adherence to care, prophylaxis, ART
- ❖ Special support

When an HIV positive patient returns for follow-up care, greet the patient and give education and support. Support to adherence is of key importance in chronic HIV care. These tasks can be done by a lay provider or nurse. Detailed Education and Support guidelines are provided in Annex A at end of this module and are also supported by communication aids.

3 Assess: Clinical review of symptoms and signs, medication use, side effects, complications

3.1 Ask

If this is first visit:

Review history. Check record for TB, other opportunistic infections, chronic problems.

For all visits:

- How have you been?
- What problems have you developed?
- Have you had any of the following? *If yes*, ask for how long and use Acute Care guidelines:
 - Cough?
 - Night sweats?
 - Fever?
 - STI signs? (use locally adapted screening question)
 - Diarrhoea?
 - Mouth sores?
 - New skin rash?
 - Headache?
 - Fatigue?
 - Nausea or vomiting?
 - Poor appetite?
 - Tingling, numb or painful feet/legs?
 - Any other pain? *If yes*, where?
 - Sexual problems?
- Have you needed urgent medical care? *If yes*, ask for record/diagnosis.
- Which medications are you taking and how often?
- Assess adherence (If on ART, see p.H36)
- What problems have you had taking the medicines/ how taken?
- Taking any other drugs (traditional remedies, TB, ARVs, illicit drugs, etc)?
- How are things at home?
- What usual physical activities are you doing?
- What else do you want to talk about?

3.2 Look

In all patients:

- Look for pallor. *If pallor*, check haemoglobin.
- Look at whites of the eye—yellow?
- Look for thrush.
- Weigh. Calculate weight gain or loss. Record. If weight loss, ask about food intake.
- Count pills to estimate adherence
- *If patient is sad or has lost interest, assess for depression.*

If any new symptoms:

- Measure temperature
- Check for nodes. If >2 cm, use Acute Care
- Look for rash
- Look for evidence of violence.
- Do further assessment of symptoms (see pages A18-54 of IMAI Acute Care module or other adult guidelines).

If first visit (also check every 6 months; skip if known problem):

- Tell patient you want to check his memory.
 - Name 3 unrelated objects, clearly and slowly. Ask patient to repeat them:
 - Can he or she repeat them? (registration problem?)

If yes, wait 5 minutes and again ask, "Can you recall the 3 objects?" (recall problem?)

3.3 Lab:

If first visit and tests available:

- Do hgb and RPR if none in last year.
- Do CD4 if available. **Absence of lab should not delay ART.**

For returning patients, check for results of TB sputums and any other laboratory tests sent last visit.

3.4 Use next page to determine HIV clinical stage (record)

3.5 Determine functional status.

Decide (record) whether:

- ❖ Able to work, go to school, do housework, or harvest (WORK)
- ❖ Ambulatory but not able to work (AMB)
- ❖ Bedridden (BED)

3.4 WHO HIV Clinical Staging

	WHO Clinical Stage 1 Asymptomatic	WHO Clinical Stage 2 Mild Disease
Weight	No weight loss	Weight loss 5-10%
Symptoms Treat common and opportunistic infections according to Acute Care and/or guidelines in this module. Follow the Treatment Plan from district clinic.	No symptoms or only: <ul style="list-style-type: none">❖ Persistent generalized lymphadenopathy	<ul style="list-style-type: none">❖ Sores or cracks around lips (angular cheilitis)❖ Itching rash (seborrhoea or prurigo)❖ Herpes zoster within last 5 years❖ Recurrent upper respiratory infections such as sinusitis or otitis❖ Recurrent mouth ulcers
Prophylaxis (according to national policy)	<ul style="list-style-type: none">❖ INH prophylaxis if eligible	<ul style="list-style-type: none">❖ INH prophylaxis if eligible❖ Cotrimoxazole prophylaxis
ARV therapy	<ul style="list-style-type: none">❖ Only if CD4 < 200	<ul style="list-style-type: none">❖ Only if CD4 < 200 or Total lymphocyte < 1200/ mm³

WHO Clinical Stage 3 Moderate Disease	WHO Clinical Stage 4 Severe Disease (AIDS)
<p>Weight loss >10%</p>	<p>HIV wasting syndrome</p>
<ul style="list-style-type: none"> ❖ Oral thrush (or hairy leukoplakia) ❖ More than 1 month: <ul style="list-style-type: none"> • Diarrhoea or • Vaginal candidiasis or • Unexplained fever ❖ Severe bacterial infections (pneumonia, muscle infection, etc) ❖ Pulmonary TB within last year 	<ul style="list-style-type: none"> ❖ Oesophageal thrush ❖ More than 1 month: <ul style="list-style-type: none"> • Herpes simplex ulcerations ❖ Lymphoma* ❖ Kaposi sarcoma ❖ Invasive cervical cancer* ❖ <i>Pneumocystis pneumonia</i>* ❖ Extrapulmonary TB* ❖ Cryptococcal meningitis ❖ HIV encephalopathy
<p>Conditions marked with an asterisk require a clinician diagnosis—this can be from records of a previous hospitalization.</p> <p>Muscle infection, pneumocystis or any other severe pneumonia, toxoplasma, cryptococcal meningitis, and extrapulmonary TB are all infections which should be referred for hospital diagnosis and treatment.</p>	<p>(Significant neurological impairment interfering with independent functioning and not due to other cause, will often improve on ARV treatment)</p>
<ul style="list-style-type: none"> ❖ INH prophylaxis if eligible and able to exclude TB ❖ Cotrimoxazole prophylaxis ❖ Other prophylaxis on Treatment Plan 	<ul style="list-style-type: none"> ❖ INH prophylaxis if eligible and able to exclude TB ❖ Cotrimoxazole prophylaxis ❖ Other prophylaxis on Treatment Plan
<ul style="list-style-type: none"> ❖ If CD4 not available, treat all in stage 3 ❖ If CD4 available, take into consideration CD4 < 350 when deciding when to treat ❖ See 8.1: Evaluate for ART ❖ Prepare for adherence 	<ul style="list-style-type: none"> ❖ All in stage 4 are medically eligible ❖ Evaluate for ART (8.1) ❖ Prepare for adherence (this requires several visits and home visit if possible)

4 Assess pregnancy and family planning status in women of childbearing age on each visit

- ❖ Determine pregnancy status
- ❖ Sexually active?
- ❖ Date of last menstruation?
- ❖ Using contraception?
- ❖ Breastfeeding?

If pregnant:

- ❖ Consider eligibility for ART- see H30.
- ❖ **If on ART**, see H30.
- ❖ Provide or refer for antenatal care and PMTCT interventions: ARV prophylaxis, safer labour and delivery, and safer infant feeding.

If pregnancy status uncertain and she is taking efavirenz (EFV), perform pregnancy test (see H30).

If not pregnant:

- ❖ Offer family planning.
- ❖ **If on ART**, do not rely on estrogen-based oral contraceptives.

5

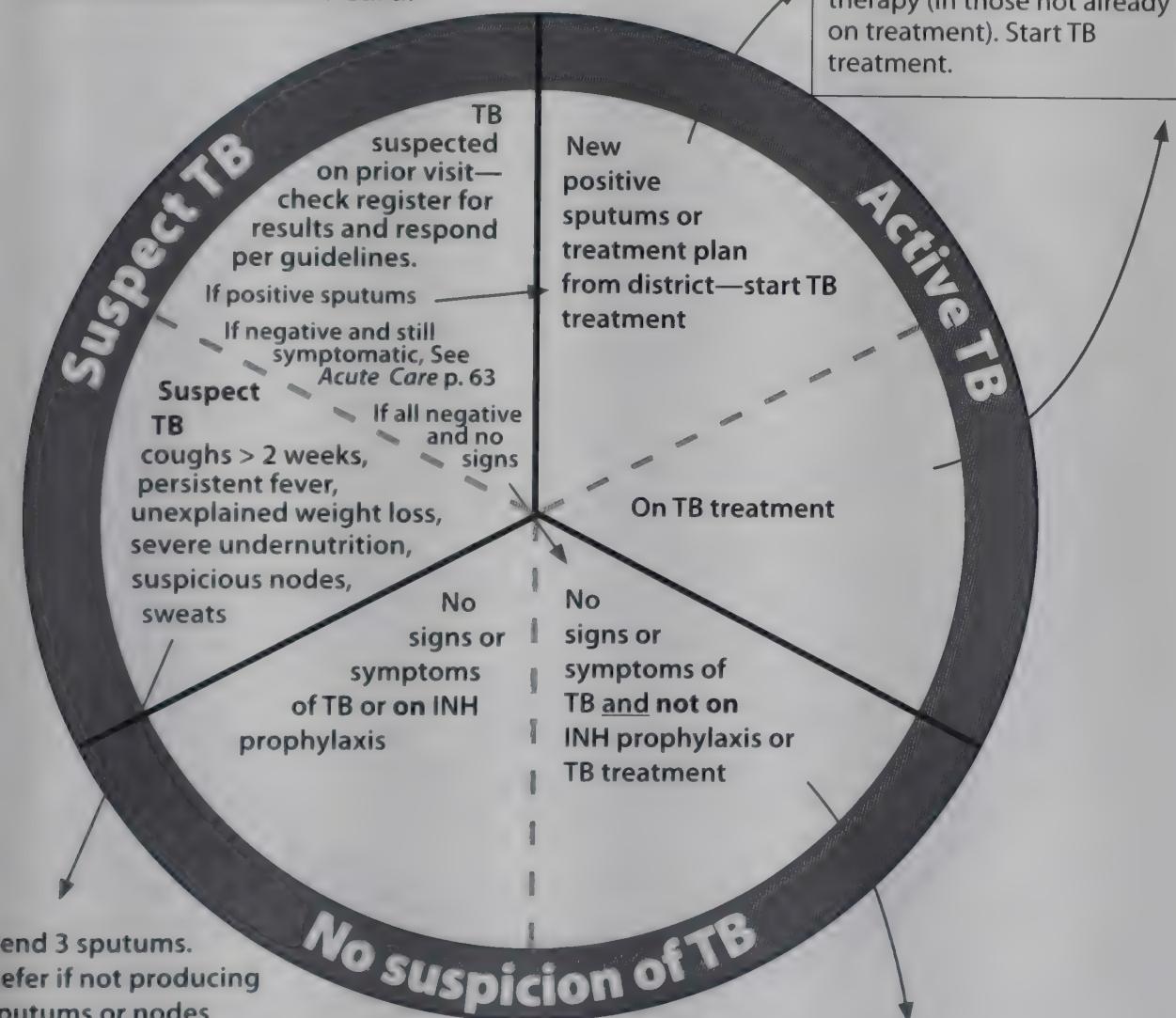
Review TB status in all patients on each visit

In what section does the patient fit?
(Every patient should be assigned to one segment.)

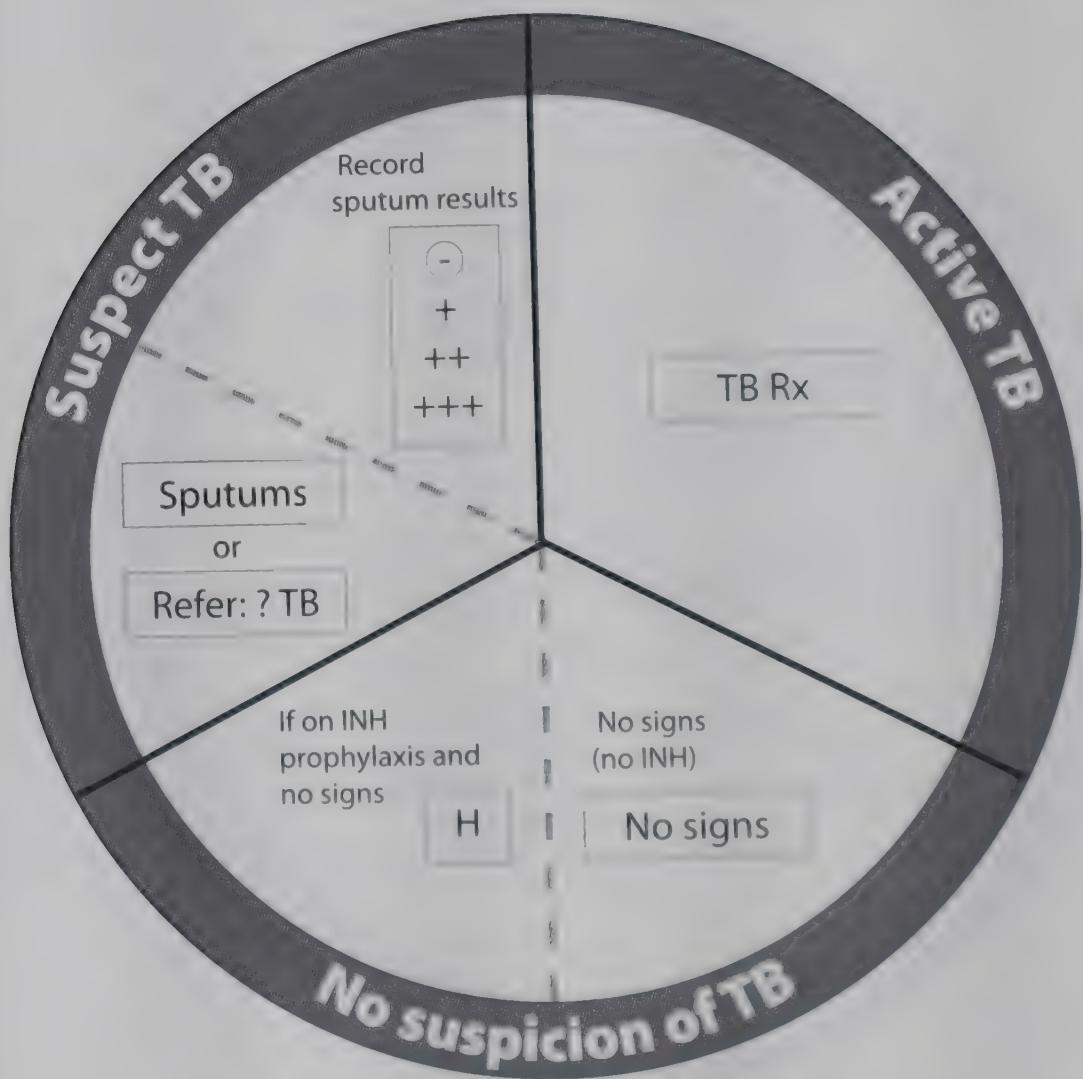
Take the necessary action, then record on Treatment Card.

Start TB treatment unless already on ARV therapy—these patients need to be referred to district clinician.

See H25 for how and when to refer TB patients for ARV therapy (in those not already on treatment). Start TB treatment.



How to record on Treatment Card



6 Provide clinical care

6.1 Respond to problems according to Treatment Plan and new signs/symptoms:

If —————→ **Then**

If pain or other new signs or symptoms (new or first presentation)	Use the Acute Care module and, if on ART, the side effect table (H41). For all patients, assure adequate pain and symptom management (see <i>Palliative Care</i> module).
If new signs of clinical stage 3 or 4 or CD4 < 200	Start cotrimoxazole prophylaxis. Evaluate for ART (8.1). Prepare patient for ART adherence (8.7). If on ART, this may represent failure or immune reconstitution syndrome. See p. H40-41. Consult/refer.
If recently received treatment in hospital	Follow Treatment Plan sent by district clinician. Re-evaluate before initiating ART if patient is eligible.
If persistent diarrhoea	Manage according to page H42 and P27.
If weight loss or wasting	Advise on nutrition (H53 and P23).
If hazardous alcohol use or depression or drug use	Use brief interventions to reduce alcohol use. Treat depression according to <i>Acute Care</i> . Manage illicit drug use (H45) All can interfere with prophylaxis and treatment adherence.
If on ART	Monitor and support adherence (H36) and respond to side effects (H41).
If pregnant	Arrange for PMTCT interventions. Review medications. Switch from efavirenz to a safe ARV drug (see p. H30).

6.2 **Advise**/discuss updated recommendations

6.3 **Agree** on treatment plan

6.4 **Assist** to follow revised plan

6.5 **Arrange** follow-up (see H44)

See General Principles of Good Chronic Care

NOTES:

7 Prophylaxis

7.1 INH prophylaxis to prevent TB (when active TB has been excluded)

Ensure adequate supply of INH before starting prophylaxis and patient desire to take daily treatment for 6 months.

Adults:

- ❖ Give 5 mg/kg isoniazid (INH=H) daily for 6 months—up to maximum dose 300 mg daily. Also give pyridoxine 50 mg/day.
- ❖ Explain treatment to patient and need to continue for 6 months.
- ❖ Explain common side effects and when to seek care.
- ❖ If patient drinks alcohol, advise to stop or reduce to low risk levels.

Monitor INH prophylaxis:

- ❖ Check adherence.
- ❖ Assess for side effects and respond as needed.
- ❖ Assess for any symptoms or signs suggestive of TB (consult or investigate if any suspicion).
- ❖ Schedule monthly visits as needed to complete 6 months treatment.
- ❖ Dispense a month's supply of INH at each visit.
- ❖ Follow-up if patient does not return.

Respond to side effects	
Minor Side Effects	Continue INH and:
• Anorexia, nausea, abdominal pain	Give INH at bedtime
• Joint pains	Give aspirin
• Burning sensation in the feet	Give pyridoxine 100 mg daily
Major Side Effects	
• New itching of skin or skin rash	
• Dizziness (vertigo & nystagmus)	
• Jaundice	
• Vomiting	
• Confusion	
• Convulsions	Stop INH

7.2 Cotrimoxazole prophylaxis

Advise patient on advantages of cotrimoxazole prophylaxis.

Initiate

- ❖ Ask about previous history of sulpha allergy (to cotrimoxazole/ Septrin®, S-P/Fansidar®)

Dispense a month's supply

- ❖ Schedule follow-up visit 2 days before the supply runs out.
- ❖ Give one double strength (960 mg) or two single-strength (480 mg) tablets daily.

Monitor

- ❖ Ask about symptoms.
- ❖ Check for rash and pallor.
- ❖ Assess adherence—ask; count pills left in bottle. Record on card.
- ❖ When on ART, stop cotrimoxazole prophylaxis when CD4 has been greater than 200 cells for 6 months.

Response to side effects	
Nausea	Continue drug and take with food. If severe or persistent vomiting, consult or refer.
Rash	If generalized rash or fixed drug reaction, or peeling or eye or mouth involvement, stop the drug and refer urgently to hospital (see <i>Acute Care</i> module p. 43).
Pallor or haemoglobin < 8 gm or bleeding gums	Stop the drug. Call for advice or refer.
New jaundice	Stop the drug. Call for advice or refer.

7.3 Fluconazole prophylaxis

Give after full treatment for cryptococcal meningitis (secondary prophylaxis)—fluconazole 200 mg/day for rest of life or until immune status reconstituted from ARV therapy.

When on ART, stop fluconazole prophylaxis when CD4 has been greater than 100 cells for 6 months, after at least 6 months treatment.

Discuss risks and benefits if pregnant or planning pregnancy.

8.1 Initiate first-line regimen for patients without complications: d4T-3TC-NVP

7 requirements to initiate ARV therapy at the health centre (working under supervision of MD/MO). d4T-3TC-NVP requires no lab to start besides an HIV test (CD4 is desirable).

1 HIV infection confirmed by written documentation

2 Medical eligibility—See clinical staging pages.

If not medically eligible, do not start ART. Repeat CD4 in 6 months if available.

3 Patient fits criteria to be started on ART at the first-level facility

1. Does the patient have a condition requiring referral to district clinician:
 - severe illness
 - any condition in stage 4 with 2 exceptions: non-severe oesophageal thrush or chronic Herpes simplex ulcerations?
2. Is the patient currently on TB treatment?
3. Is there peripheral neuropathy?
4. Is there jaundice or known liver problem?
5. Chronic illness such as diabetes mellitus, heart or kidney disease, etc.?
6. Is patient a child?
7. Prior ARV use except nevirapine for PMTCT?

NO to all

Give d4T-3TC-NVP

This regimen can be initiated at the first-level facility.

Instructions are on H26.

YES to any question

Do not start first-line regimen at health centre—consult or refer to district ARV clinician for ARV therapy plan.

If patient is on treatment for TB, see page H25 for when to refer or start treatment.

If patient is pregnant, see page H30.

These generic guidelines assume d4T-3TC-NVP is the preferred first-line ARV regimen. Other first-line regimens (ZDV-3TC-NVP, d4T-3TC-EFV, ZDV-3TC-EFV) could be substituted or added during country adaptation. For operational reasons, WHO recommends d4T-3TC-NVP in fixed dose combination as the most suitable regimen for immediate implementation of the 3x5 strategy in resource limited settings.

4 Any opportunistic infection has been treated/stabilized (at health centre or if severe at district clinic/hospital). See summary on next page.

5 Patient is ready for ARV therapy—after using section 8.7

- Patient understands ARV therapy, possible side effects, limitations, adherence schedule, etc and wants treatment.
- Patient ready for treatment adherence.
- Patient actively involved in own care.
- Family and/or social support available.
- Treatment supporter if possible.
- No recent nonadherence to care or medication (several visits are required before treatment initiation).
- Barriers to adherence have been addressed such as highly unstable social situation, heavy alcohol dependence, or serious psychiatric illness.

6 Supportive clinical team prepared for chronic care

7 Reliable drug supply

Remember: ARV therapy for the individual patient is rarely an emergency!

The public health emergency is to get large numbers of the right patients on treatment with good adherence and good overall HIV chronic care.

For the individual patient, management of life-threatening opportunistic infections can be an emergency.

8.2 Treat opportunistic infections before starting ART

If patient has this opportunistic infection or other clinical problem:	Follow these instructions (using Acute Care guidelines):
Severe illness or any severe (pink) classification in Acute Care guidelines.	Refer to district clinic/hospital for OI management and to decide on ARV regimen. Follow Treatment Plan when patient returns.
Non-severe pneumonia and is being treated with antibiotics.	Wait for 2 weeks after completing antibiotics (to be sure this was not TB) before starting ART.
Malaria, on antimalarial treatment, or mouth/throat infection, STI, UTI, reactive lymphadenopathy or other condition requiring antibiotics.	Treat as in Acute Care guidelines. Do not start ART until treatment completed and no longer febrile. Refer if persistent fever.
Drug reaction.	Do not start ART during an acute reaction. (If already on ART, see page 41.)
Prurigo or other known chronic skin problem.	Do not delay ARV therapy. Manage skin problems (see Acute Care).
Oesophageal thrush and able to swallow fluconazole (if severe oesophageal thrush, refer).	Start ART after fluconazole treatment if patient can swallow.
Persistent diarrhoea and has already had empirical treatment and clinician evaluation and symptoms are controlled.	Do not delay ART waiting for resolution.
Non-severe anaemia has not responded to treatment.	Do not delay ARV therapy (is often anaemia of chronic disease due to HIV).
Old diagnosis (after hospitalization and full treatment) of cryptococcal meningitis, toxoplasma brain abscess, HIV encephalopathy AND now stable (no new signs).	Start ARV therapy or refer to district clinician for treatment plan.
Persistent fever without explanation	Refer for evaluation by district clinician

8.3 First-level facility TB management in HIV patients not on ART*

If patient already on ARV therapy when positive TB sputums or suspect TB, refer to district ARV clinician for treatment plan. Do not start TB treatment at first-level facility.

Patient clinical status	No CD4 available	CD4 available
Smear-positive pulmonary TB only (no other signs stage 3 or 4) and patient is gaining weight on treatment.	Start and complete TB treatment** according to TB guidelines then start first-line ARV regimen.	If CD4 < 200/mm, start TB treatment. Start ARV co-treatment*** as soon as TB treatment is tolerated (between 2 weeks and 2 months).
Smear-negative pulmonary TB only (no other signs 3 or 4) and patient is gaining weight on treatment.	Continue TB treatment** and consult/refer to district clinician for TB/ARV treatment plan. (Smear negative TB requires clinician diagnosis.)	If CD4 between 200-350/mm, start TB treatment. Start ARV co-treatment*** after initiation phase (unless severely compromised).
Pulmonary TB and patient has or develops signs of clinical stage 4 or thrush, pyomyositis, recurrent pneumonia, persistent diarrhoea, new prolonged fever, or losing weight on treatment.	Continue TB treatment** and refer to district ARV clinician for decision on co-treatment. If patient has already completed TB treatment, start first-line ARV therapy after managing OIs (see table to left; this may require referral to district clinician).	If CD4 > 350/mm, give TB treatment. Defer ART unless non-TB Stage 4 conditions are present.
Extrapulmonary TB	If current: continue TB treatment** and refer to district ARV clinician for decision on co-treatment. If completed extrapulmonary TB treatment in last year and no new complications or signs, start first-line ARV therapy.	

* There is currently insufficient evidence—these guidelines suggest a format for decision making at first-level facility but need a national decision and more data, taking into account the impact of referring all smear-positive TB/HIV patients detected at first-level facility to the district clinic.

** Regimen should include pyridoxine.

*** Consult/refer to district clinician for TB/ARV therapy plan.

8.4 First-line ARV regimen instructions

How to give d4T-3TC-NVP :

Give every 12 hours.

Note that NVP requires an escalating dose once daily for two weeks, then twice daily

Usual adult and adolescent dose:

- Nevirapine (NVP) 200 mg once daily for 2 weeks then 200 mg twice daily (first 2 weeks it is necessary to use separate tablets)
- Stavudine (d4T) 40 mg twice daily (30 mg twice daily if less than 60 kg)
- Lamivudine (3TC) 150 mg twice daily

These are available in fixed-dose combinations for the two doses of d4T (40 mg and 30 mg).

For first 2 weeks only:

- In the morning: combined tablet with d4T-3TC-NVP
- In the evening: separate tablets for d4T and 3TC

After this:

- Morning and evening: combined tablet with d4T-3TC-NVP

No diet restrictions

No lab requirement

Prepare to cope with these common minor side effects:

- ❖ Insomnia
- ❖ Nausea
- ❖ Diarrhoea
- ❖ Headache
- ❖ Fatigue
- ❖ Abdominal discomfort
- ❖ Mild rash (but can be severe—must see health worker)

See page 41 for response to side effects.

Major toxic effects with this regimen

- ❖ Neuropathy (d4T) (usually after weeks or months switch)
- ❖ Fat changes—arms, legs, buttocks, and cheeks become thin; breasts, belly, back of neck gain fat (d4T)
- ❖ Pancreatitis (presents as abdominal pain (d4T)
- ❖ Liver toxicity: jaundice or liver tenderness (NVP)
- ❖ Severe rash (NVP)
- ❖ Lactic acidosis (d4T)—can present as fatigue or shortness of breath
- ❖ Fever (NVP)

Refer- see page 41.

How to give d4T-3TC -EFV:

Give d4T-3TC every 12 hours

- ❖ Give d4T-3TC in morning
- ❖ Give d4T-3TC plus EFV 600 mg at night

Usual adult and adolescent dose:

- Efavirenz (EFV) 600 mg once daily
- Stavudine (d4T) 40 mg twice daily (30 mg twice daily if less than 60 kg)
- Lamivudine (3TC) 150 mg twice daily

Lab: Must exclude pregnancy in woman of childbearing age (pregnancy test mandatory); ask about menstrual periods and possibility of pregnancy each visit; assure reliable contraception.

Avoid if serious psychiatric problem (now or by history)

Do not take efavirenz with fatty meal.

Prepare to cope with these common minor side effects:

- ❖ Somnolence
- ❖ Insomnia
- ❖ Confusion
- ❖ Nightmares
- ❖ Dizziness
- ❖ Nausea
- ❖ Diarrhoea
- ❖ Headache
- ❖ Fatigue
- ❖ Rash—usually mild but can be severe—must see health worker

See page 41 for response to side effects.

Major toxic effects with this regimen

- ❖ Neuropathy (d4T) (usually after weeks or months switch)
- ❖ Fat changes—arms, legs, buttocks, and cheeks become thin; breasts, belly, back of neck gain fat (d4T)

- ❖ Pancreatitis (presents as abdominal pain) (d4T)
- ❖ Lactic acidosis (d4T)—can present as fatigue or cough (after months of treatment)
- ❖ Liver toxicity (EFV)
- ❖ Severe rash (EFV)
- ❖ Severe confusion, psychosis, depression (EFV)

Refer- see page 41.

How to give ZDV-3TC-NVP:

Give every 12 hours.

Note that NVP requires an escalating dose once daily for two weeks, then twice daily

Usual adult and adolescent dose:

- Nevirapine (NVP) 200 mg once daily for 2 weeks then 200 mg twice daily (first 2 weeks it is necessary to use separate tablets)
- Lamivudine (3TC) 150 mg twice daily
- Zidovudine (ZDV) 300 mg twice daily

No food restrictions

Lab: measure haemoglobin before starting ZDV

Prepare to cope with these common minor side effects:

- ❖ Nausea
- ❖ Diarrhoea
- ❖ Headache
- ❖ Fatigue
- ❖ Mild rash (but can be severe- must see health worker)

See page 41 for response to side effects.

For first 2 weeks only:

- In the morning: combined tablet with ZDV-3TC-NVP
- In the evening: separate tablets for ZDV and 3TC

After this:

- Morning and evening: combined tablet with ZDV-3TC-NVP

Major toxic effects with this regimen

- ❖ Severe anaemia (ZDV)
- ❖ Muscle tenderness or inflammation
- ❖ Liver toxicity: if jaundice or liver tenderness—send for ALT (ZDV, NVP)
- ❖ Lactic acidosis (ZDV)—can present as fatigue or shortness of breath
- ❖ Severe rash (NVP)

Refer- see page 41.

How to give ZDV-3TC-EFV:

Give ZDV-3TC every 12 hours plus EFV at night.

Usual adult and adolescent dose:

- Lamivudine (3TC) 150 mg twice daily
- Zidovudine (ZDV) 300 mg twice daily
- Efavirenz (EFV) 600 mg at night

Lab: measure haemoglobin before starting ZDV.

Must exclude pregnancy in woman of childbearing age (pregnancy test mandatory); ask about menstrual periods and possibility of pregnancy each visit; assure reliable contraception (consider injectable contraception plus condoms)

Avoid if serious psychiatric problem (now or by history)

Do not take efavirenz with fatty meal.

Prepare to cope with these common minor side effects:

- ❖ Nausea
- ❖ Diarrhoea
- ❖ Headache
- ❖ Fatigue
- ❖ Somnolence
- ❖ Insomnia
- ❖ Confusion
- ❖ Nightmares
- ❖ Dizziness

See page 41 for response to side effects.

Major toxic effects with this regimen

- ❖ Severe anaemia (ZDV)
- ❖ Muscle tenderness or inflammation (ZDV)
- ❖ Liver toxicity: if jaundice or liver tenderness—send for ALT (ZDV, EFV)
- ❖ Lactic acidosis (ZDV)—can present as fatigue or cough
- ❖ Severe rash (EFV)
- ❖ Severe confusion, psychosis, depression (EFV)

Refer- see page 41.

8.5 Special considerations for ART in pregnant women

Medical eligibility is the same as non-pregnant adults.

- ❖ In advanced HIV disease, the benefits of ART in the first trimester outweigh potential risk to the unborn child.
- ❖ In less advanced disease, consider delay until the second trimester. If pregnancy is identified during the first trimester, help the woman weigh risks and benefits. Discuss with woman and consult with clinician.

If ART is temporarily discontinued during first trimester, stop all drugs at once then restart all drugs at the same time.

Choice of ARV regimen may differ.

Do not use:

- ❖ Efavirenz (EFV)—it can be a teratogen.
- ❖ DDI-d4T combination—this can be very toxic.

It may also be necessary to switch ARV drugs if GI side effects are made worse by morning sickness.

Consult with district ARV clinician.

Special management needs:

- ❖ Family—centered chronic HIV care where the woman, her infant, other children, and partner are cared for together.
- ❖ Good coordination with antenatal and post-partum care.
- ❖ Additional support for adherence which can be particularly difficult during pregnancy and post-partum.

Counsel on choice of how to feed her infant then support her in that choice (see *HIV and Infant Feeding*)

- ❖ Provide good support for exclusive breastfeeding (see *IMCI-HIV Adaptation*). Continue ARV therapy when breastfeeding.
- ❖ Support replacement feeding if this is her choice (see section A7 and *IMCI-HIV Adaptation*).

If not eligible for ARV therapy at this time, give standard ARV prophylaxis regimen to prevent mother to child transmission of HIV (PMTCT).

8.6 Summary of patient flow to initiate ART

HIV+ and symptomatic

- Determine HIV clinical stage and CD4 [or total lymphocyte] and whether eligible for ART

Eligible for ART if available

Not eligible now for ART

- Treatment of opportunistic infections to stabilize; referral to district clinic as needed
- Adherence preparation (requires at least 2 visits)
- Education and support
- Home visit if possible
- Enlist and prepare treatment supporter

- Opportunistic infections treated
- Patient and treatment supporter ready for adherence to ARV therapy (clinical team meeting)

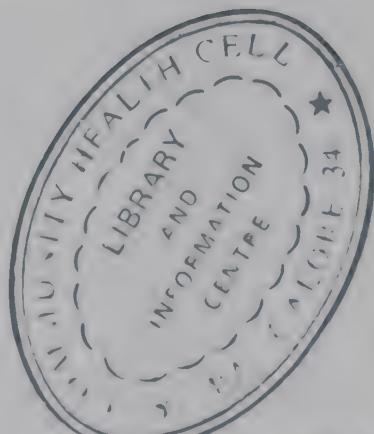
- Prophylaxis as indicated
- Clinical monitoring and restaging
- ART when ready
- Ongoing support and education in clinic and community
- Prevention

Initiation of ARV therapy

- a. Patients without complications at health centre under MD/MO supervision
- b. Others by MD/MO

Follow-up sequence:

- Monitoring
- Adherence and psychosocial support



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H31

8.7 ARV therapy: adherence preparation, support and monitoring

Prepare for ARV therapy:

ASSESS

- ❖ Patient's goals for today's visit
- ❖ Understanding of ARV therapy
- ❖ Interest in receiving therapy

ADVICE ON

- ❖ HIV illness, expected progression (locally adapted).
- ❖ ARV therapy.
 - Benefits-lifesaving drugs. Your life depends on taking them every day at the right time.
 - Very strong medicines.
 - The pills do not cure HIV.
 - The pills do not prevent HIV transmission to others—you must still use condoms and practice safer sex.
- ❖ Need for complete adherence to daily treatment (more than other drugs you may be familiar with—essential to maintain drug levels in the blood for ARV therapy to work).
- ❖ Must be taken twice daily, without interruption.
- ❖ If you forget a dose, do not take a double dose.
- ❖ Must be taken at right time, every 12 hours (adjust this if on a different regimen)
- ❖ If you stop, you will become ill (not immediately—after weeks, months or years).
- ❖ Possibility of side effects and drug interactions.
- ❖ Importance of disclosure of HIV+ status (p. H60)
- ❖ Importance of testing partner and children.
- ❖ Drugs must not be shared with family or friends—patient must take full dose.

A GREE

- ❖ Establish that the patient is willing and motivated and agrees to treatment, before initiating ARV therapy.
 - Has the patient demonstrated ability to keep appointments, to adhere to other medications?
 - Has the patient disclosed his or her HIV status? If not, encourage him or her to do so. Disclosure to at least 1 person who can be the treatment buddy is important (required in many programmes).
 - Does the patient want treatment and understand what treatment is?
 - Is the patient willing to come for the required clinic follow-up?

A SSIST

- ❖ Help the patient develop the resources/support/arrangements needed for adherence:
 - Ability to come for required schedule of follow-up. *Discuss how patient will do this (Do you live close to here? If not, how will you manage to come for the scheduled appointments?)*
 - Home and work situation that permits taking medications every 12 hours without stigma.
 - Regular supply of free or affordable medication.
 - Supportive family or friends.
 - ARV adherence support group.
 - Treatment supporter—prepare him or her (H39).

A RRANGE

- ❖ When patient is ready for ARV therapy, discuss at clinical team meeting then make plan.

Support ARV initiation (as patient first starts on medications):

A SSESS

- ❖ Patient's goals for today's visit.
- ❖ Check understanding of the information given before—make sure the patient understands (locally adapted) the illness, treatment and possible side effects.

A DVISE ON

- ❖ Reinforce the information given before.
- ❖ Advise on details of first-line regimen:
 - Explain the purpose of and how to take each pill. Provide and explain card summarizing treatment (with drawing of each pill and common side effects).
- ❖ Make sure patient understands the importance of adherence.
- ❖ Advise on diet (insert recommendations appropriate to first-line regimen).
- ❖ Explain limits on alcohol and drug use (counsel on low risk drinking or abstinence—see *Brief Intervention* module). These are important for adherence.
- ❖ Explain side effects.
 - Prepare patient and treatment supporter to handle common side effects. Most side effects can be treated symptomatically.
 - Explain which side effects are likely to be transitory (related to initiation of treatment) and their likely duration.
 - Explain which are more serious and require return to clinic.
- ❖ Explain that patient can still transmit HIV infection when on ARV therapy. It is very important to still practice safer sex and other practices to prevent transmission (see H45).

A GREE

- ❖ Make sure the patient agrees to the regimen and is a true partner in the treatment plan.
- ❖ Make sure patient understands that his/her life depends on taking the medicine every day.
- ❖ Agree on plan for support by treatment buddy and support groups.

A SSIST

- ❖ Develop (then reinforce on each visit) a concrete plan for the specific ARV regimen.
 - When to take/times for every 12 hour dosing/how to make it a habit.
 - Explain escalating dose of niverapine.
 - How to remember—provide and explain written schedule, pillbox, pill chart, other aids.
- ❖ Prepare patient and treatment buddy for adherence, possible common side effects, what to do if they occur, and when to seek care (give treatment card).
- ❖ Provide psychosocial support (H54-55).
- ❖ Encourage patient to join ARV adherence support group.
- ❖ Arrange home visit, if feasible.

A RRANGE

- ❖ Next follow-up visit in clinic, home visit if feasible, and next visit with district clinician (if required).
- ❖ Agree on best way to access help between visits.
- ❖ Make sure patient understands where/when s/he will see health worker. (see follow-up p. H48).

Monitor and support adherence

ASSESS

Do clinical review (p. H10) and respond to any problems or changes in status (use side effect table on page H41 or refer to health worker). To assess adherence:

- ❖ Review the medications with the patient and their treatment supporter. Determine whether there is an adherence problem.
- ❖ Ask questions in a respectful and non-judgmental way. Ask in a way that makes it easier for patients to be truthful:
 - "Many patients have trouble taking their medications. What trouble are you having?"
 - "Can you tell me when and how you take each pill?"
 - "When is it most difficult for you to take the pills?"
 - "It is sometimes difficult to take the pills every day and on time. How many have you missed in the last 4 days (insert agreed time period)?"
- ❖ Ask about the common and locally important factors that may interfere with adherence.
- ❖ Ask about stigma related to taking the pills.
- ❖ Count pills.
- ❖ How many pills forgotten yesterday, last 3 days, last month?

If poor adherence: Determine what the problem is:

- Side effects?
- Simply forgot?
- Ran out of pills?
- Which dose missed: morning or evening? Why?
- Cost?
- Reminds you of HIV?
- Misunderstood? (explain, use aids).
- Changed work situation?
- Not comfortable taking medication around others?
- Stigma?
- Different timing when away from home or holiday, travel, weekend?
- Seldom at home and disorganized?
- Problems with diet (food availability)?
- Another medical problem?
- Screen for excess alcohol use and depression and treat, if present.

Other locally common constraints

A DVISE

- ❖ Reinforce the information given before.
- ❖ Give additional information that may help with adherence problem.
- ❖ Advise on any suggested changes in the regimen (after consulting with clinician). (If treatment needs to be stopped, or if patient decides to stop a drug, stop all medications at once and consult with clinician. Usually side effects require only changing one drug, not stopping—consult with clinician if this is necessary).

A GREE

- ❖ Agree on any changes in Treatment Plan and solutions to adherence problems (if present).
- ❖ Discuss the agreements you have reached and check for their commitment.

A SSIST

- ❖ Provide adherence support.
- ❖ Reinforce interventions which match the patient's needs and adherence problems, if present (see *Assist* on page H31).
- ❖ Make sure that the patient has:
 - Plan to link taking medications with daily events such as meals.
 - Any device or skills (e.g. how to use a diary) that he or she needs.
- ❖ Make sure patient has the support he or she needs:
 - Get help from treatment buddy, other family and friends or peers.
 - Help patient and treatment supporter to find solutions.
- ❖ If adherence problem:
 - Get help! Call for advice or refer back sooner but do not "just refer."
 - Link with home-based care for help and home visits.
 - Seek help from district clinic adherence staff if regimen is too complicated or not tolerated or low adherence.
- ❖ If repeated missed doses, use special interventions (home visit, etc)

A RRANGE

- ❖ Record adherence estimate on patient's card.
- ❖ Arrange for refills.
- ❖ Arrange for next follow-up visits:
 - in clinic
 - home visits
- ❖ Make sure that the patient and supporter understand the follow-up plan and how to contact the clinic team if there is a problem.

8.8 Patient/treatment supporter education card

ART plus key preventive interventions

Adapt locally

Good news

- ❖ ART can stop the HIV virus from multiplying.
- ❖ You will probably gain weight, start feeling well, and resume your normal activities.

Not so good news

- ❖ Not a cure—need to take the ARV drugs for rest of one's life.
- ❖ You still have HIV infection.
- ❖ You still can transmit HIV—safer sex and other precautions are still important.
- ❖ You must swallow the medicines twice daily and miss no doses. This is important to maintain blood levels.
- ❖ If you miss doses, resistance will develop (insert locally adapted explanation)—this is both bad for you and for your community (uses up the treatment options). Even missing 3 doses in a month is too much!
- ❖ Requires lifelong clinical care and occasional lab tests.
- ❖ Side effects can occur. Prepare patient to cope with common side effects of his/her regimen:
 - If nausea, take with food.

When to seek care

8.9 Prepare a treatment supporter (guardian/buddy)

Adapt locally

8.10 Respond to new signs and symptoms/possible side effects in patient on ART

These may be:

- ❖ A side effect of the ARV therapy.
- ❖ A new opportunistic infection.

or

- ❖ Immune reconstitution syndrome.

(The stronger immune system reacting to an infection that had been invisible; usually within 2-3 months of starting treatment.)

Clinical monitoring at the first-level facility requires the ability to consult with the district clinician on your clinical team. This will require support for cell phone or radio telephone communications.

Signs or symptoms Response:

Nausea	Take with food (except for DDI or IDV). If on zidovudine, reassure that this is common, usually self-limited. Treat symptomatically. If persists for more than 2 weeks or worsens, call for advice or refer.
Headache	Give paracetamol. Assess for meningitis (see <i>Acute Care</i>). If on zidovudine or EFV, reassure that this is common and usually self-limited. If persists more than 2 weeks or worsens, call for advice or refer.
Diarrhoea	Hydrate. Follow diarrhoea guidelines in <i>Acute Care</i> module. Reassure patient that if due to ARV, will improve in a few weeks. Follow up in 2 weeks. If not improved, call for advice or refer.
Fatigue	This commonly lasts 4 to 6 weeks especially when starting ZDV. If severe or longer than this, call for advice or refer.
Anxiety, nightmares, psychosis, depression	This may be due to efavirenz. Give at night; counsel and support (usually lasts < 3 weeks). Call for advice or refer if severe depression or suicidal or psychosis. Initial difficult time can be managed with amitriptyline at bedtime.
Blue /black nails	Reassure. It's common with zidovudine.
Rash	If on nevirapine or abacavir, assess carefully. Is it a dry or wet lesion? Call for advice. If generalized or peeling, stop drugs and refer to hospital.
Fever	Check for common causes of fever (see <i>Acute Care</i>). Call for advice or refer. (This could be a side effect, an opportunistic or other new infection, or immune reconstitution syndrome.)
Yellow eyes (jaundice)	Stop drugs. Call for advice or refer. (Abdominal pain may be pancreatitis from DDI or d4T.) If jaundice or liver tenderness, send for ALT test and stop ART (nevirapine is most common cause). Call for advice or refer.
Abdominal or flank pain	Stop drugs. Call for advice or refer. (Abdominal pain may be pancreatitis from DDI or d4T.) If jaundice or liver tenderness, send for ALT test and stop ART (nevirapine is most common cause). Call for advice or refer.
Pallor: anaemia	If possible, measure hemoglobin. Refer (and stop ZDV) if severe pallor or symptoms of anaemia or very low haemoglobin (<8 grams).
Tingling, numb or painful feet/legs	If new or worse on treatment, call for advice or refer. Patient on d4T-3TC-NVP should have the d4T discontinued—substitute ZDV if no anaemia (check haemoglobin).
Cough or difficult breathing	This could be immune reconstitution syndrome. Call for advice. (Stop drug and consult/refer.)
Changes in fat distribution	Discuss carefully with your patient—can he or she accept it?

Consult with clinician if patient is taking other ARV drugs.

Manage chronic problems

9.1 Manage persistent diarrhoea*

Give empirical antimicrobial treatment if no blood in stool:

- ❖ Treat with: cotrimoxazole + metronidazole. Follow up in 7 days.
- ❖ If no response, refer. If referral is difficult, treat with: albendazole or mebendazole.
- ❖ If good response to an antimicrobial, continue for 2 weeks total treatment.
- ❖ If diarrhoea does not stop within 2 weeks or after second treatment, refer for management, including possibility of starting ART therapy.

Give supportive/palliative care:

- ❖ Increase fluid intake.
 - This is very important to prevent dehydration.
 - Give ORS if large volume diarrhoea (see Fluid Plan B in *Acute Care*).
- ❖ Give constipating drug unless blood in stool or fever or elderly (see P24 in *Palliative Care module*).
- ❖ Advise on special care of the rectal area (P26).
- ❖ Advise on a supportive diet for patients with diarrhoea (P27).
- ❖ Monitor weight (patient can monitor change in fit of clothes).
- ❖ Follow up regularly.

*** Most of the problems in this section should improve on ART.** If patient is on ART and these problems develop, make sure the patient is adherent and consult or refer to district clinician—this may indicate toxicity from the treatment or that ART is not working. Exclude TB if fever or weight loss—this may require referral to the district clinic.

9.2 Manage recurrent or severe candidiasis*

For recurrent candida vaginitis which does not respond to first-line antifungal (nystatin):

- ❖ Give fluconazole 200 mg on the first day then 100 mg/day for 10 days. Do not give during pregnancy.
- ❖ Follow up in 2 weeks.
- ❖ If vaginitis persists on follow-up or is recurrent, treat woman and partner at the same time.
- ❖ If still recurrent, consult or refer (she may need an intermittent treatment regimen or ART).

For oral thrush which does not respond to the first-line antifungal:

- ❖ Use miconazole gum patch if only nystatin or gentian violet was used previously.
- ❖ If still no response, give fluconazole for 10 days.
- ❖ Follow up in 2 weeks.
- ❖ If oral thrush persists on follow-up or is recurrent, consult or refer. Patient may need intermittent treatment regimen.

*** Most of the problems in this section should improve on ART.** If patient is on ART and these problems develop, make sure the patient is adherent and consult or refer to district clinician—this may indicate toxicity from the treatment or that ART is not working. Exclude TB if fever or weight loss—this may require referral to the district clinic.

9.3 Manage persistent fever

Empirical antimicrobial treatment

- ❖ Treat for malaria if malaria smear positive or if smear is negative or not available and no treatment within the last month (adapt locally).
- ❖ Always consider TB when persistent fever, even if there is no cough. Refer to district clinician or consult for possibility of empirical TB treatment.
- ❖ See Acute Care module (p. 24) to consider common causes of fever.

Refer patient to district for consideration of ART when eligible. If on ART already, this may be immune reconstitution syndrome or a side effect—consult/refer.

Give supportive care:

- ❖ Increase fluid intake.
This is very important to prevent dehydration.
- ❖ Tepid sponging if patient likes it.
- ❖ Follow up regularly.

9.4 Manage weight loss*

- ❖ Assess for possible causes and treat:
 - Assess diet and give advice to increase high energy foods.
 - Make sure painful oral and oesophageal infections are not interfering with eating.
 - If persistent diarrhoea, treat.
 - If lack of appetite or nausea, see recommendations on P23.
 - Consider TB (consult or refer if necessary).
- ❖ See recommendations in the *Palliative Care* module (P23).
- ❖ Start ART therapy when eligible.

9.5 Special interventions for injecting drug users

People who inject drugs are particularly vulnerable to HIV and may have difficulties in dealing with health professionals (and vice-versa). Extra care is therefore needed to ensure they get the best service available.

- ❖ Encourage them to:
 - Use sterile injecting equipment each time they inject.
 - Not pass on used needles or syringes to others.
- ❖ Make clean needles and syringes available.
- ❖ Check for common infections such as local abscesses, pneumonia, tuberculosis and hepatitis.
- ❖ Help them to stabilize their lifestyles. Integrate care with drug substitution and other treatment and support services.
- ❖ Be aware that some medications may induce withdrawal if they are on methadone:
 - Rifampicin.
 - Several ARV medications: efavirenz (EFV), nevirapine (NVP), or protease inhibitors.
- ❖ Special considerations in ART:

EFV or NVP can decrease plasma levels of methadone and lead to opiate withdrawal. Patients should be monitored for signs of withdrawal and their methadone dose increased as required to alleviate withdrawal symptoms.

10.1 Dispense medications according to Treatment Plan

- ❖ Check the Treatment Plan
- ❖ Adherence
 - Make sure adherence has been assessed and supported (H32).
 - Record estimate on Treatment Card.
- ❖ Make sure patient understands:
 - how to take the drugs
 - how to store the medications
 - what to do if a dose is forgotten
 - what to do if a dose is vomited
 - common side effects and how to manage them
 - when to seek care (use patient card)
 - whom to contact when there is a problem

Explain, then ask checking questions.
- ❖ Observe patient swallowing first dose. If partial clinic-based directly observed treatment is planned, do this on each visit and mark treatment calendar.
- ❖ When on ARV medication, be careful if another drug is started for another problem, or if the patient's condition has changed (use table to right).
- ❖ Ask patient about:
 - other drugs
 - herbal remedies
- ❖ Follow drug management supply guidelines.
- ❖ Dispense drugs (record).
- ❖ Advise to return on follow-up visit with:
 - stock of drugs
 - treatment supporter

10.2 First -line ARV drug interactions

If patient is taking:	Do not co-administer with these drugs (Call for advice for alternative treatment)	Other cautions
nevirapine (NVP)	❖ rifampicin ❖ ketoconazole	Do not rely on estrogen-based oral contraceptives—switch or use additional protection. If on methadone, will need to increase dose. Monitor for withdrawal signs.
lamivudine (3TC)	No major drug interactions	
stavudine (d4T)	Do not give with ZDV (zidovudine, AZT)	Higher risk of d4T neuropathy when also taking INH.
zidovudine (ZDV, AZT)	Do not give with d4T or ganciclovir	Higher risk of anaemia when also taking aciclovir or sulpha drugs.
efavirenz (EFV)	❖ diazepam (OK for convulsions in emergency) ❖ other benzodiazepines other than lorazepam ❖ phenobarbitol ❖ phenytoin ❖ protease inhibitor ARVs	Do not take with high fat meal. If on methadone, will need to increase dose. Monitor for withdrawal signs.

Consult with clinician if patient is taking other ARV drugs.

Insert local traditional medicines which interact with first-line ARV drugs.

10.3 Arrange follow-up visit in clinic

Clinical Stage	Patient Status	Follow-up Schedule More frequent visits may be needed for more counselling.
Stage 1 or 2	Pregnant woman	Follow-up at antenatal visits (3 after quickening; more may be needed for counselling). Provide or refer for PMTCT interventions.
	Post-partum or lactating mother	At 2 weeks post-partum during newborn's immunization visits. Then every 3 months.
	All other adults	Every 6 months (unless new problem arises).
Stage 3 or 4	On TB treatment	Every month—combine with follow-up visit for TB.
	All patients	<p>If not on ART, every month.</p> <p>When starting ART: Every week for 2 weeks, then every 2 weeks for 2 months, then monthly (adapt locally).</p> <p>Once stable and symptom-free for 1 month, patient may only need to see health worker every 3 months.</p> <p>For patients with complicating conditions who require close monitoring and lab by district clinician (adapt locally):</p> <ul style="list-style-type: none"> • District clinic initiates and checks every 1-2 weeks for 2 months. <p>If no problem, follow up at:</p> <ul style="list-style-type: none"> • Nurse or first-level facility at month 2 and 3. • District clinician at month 4. • Nurse or first-level facility at month 5 and 6. • District clinician at month 7. • Nurse or first-level facility at month 8 and 9. • Etc.

10.4 Follow-up defaulters

- ❖ Arrange home visit.
- ❖ Consult with treatment supporter and relevant CBO.

10.5 Link to community care and arrange home visits as needed

Link and refer to community services—community health workers; CBO's, NGO's, FBO's; and traditional practitioners as appropriate.

10.6 Record data

- ❖ Transfer key Treatment Card data to register.
- ❖ Enter data on SmartCard or other system if in use.

The following information will be used to determine whether the ARV therapy is working:

- Weight
- Patient's function
- Adherence estimate
- New opportunistic infection after 6 months

11.1 Prevent transmission to others

Warn about the risks of infecting others

- ❖ Explain risk of infection to sexual partners.
- ❖ If on ARV therapy: you can still transmit HIV infection (and can be re-infected)—you must still use condoms.

Counsel on safer sex and provide condoms

Safer sex is any sexual practice that reduces the risk of transmitting HIV and other sexually transmitted infections (STI) from one person to another.

- ❖ Counsel on options for sexual expression (asking them how feasible this seems to them):
 - Delay sexual activity.
 - Reduce the number of sexual partners. Better yet, stay faithful to one partner.
 - Condoms:
How to use:
 - Use model to demonstrate correct use.
 - Condom should be used before any penetrative sex, not just before ejaculation.
 - How to negotiate condom use.
 - Provide condoms.
- ❖ Counsel on less risky sex—choose sexual activities that do not allow semen, fluid from the vagina, or blood to enter the mouth, anus or vagina of the partner.
- ❖ For men, also emphasize:
 - Do not have sex with teenagers or girls. Counter any myths of cleansing of HIV infection.
 - Treat STI promptly.

Discuss disclosure (see H60)

Encourage partner and friends to be tested

If woman of childbearing age or any man, counsel on reproductive choices

- ❖ Advise on the risk of maternal to child transmission and discuss PMTCT interventions.
- ❖ Offer family planning:
 - Advise on possibility of tubal ligation, vasectomy.
 - All contraceptive methods may be used, however:
 - Do not encourage IUD in women at risk of STI.
 - Avoid oral contraception—these can interact with some ARV drugs.
 - Encourage condom use in all, no matter what contraception is used, to protect from STI, re-infection with HIV, and to avoid transmission to sexual partners (dual protection).

If considering pregnancy:

- ❖ Discuss interventions available to prevent maternal to child transmission (PMTCT): (insert summary of what is available locally).
- ❖ Once pregnant, resume using condoms again to protect oneself.

If pregnant:

- ❖ Use antenatal guidelines.
- ❖ Discuss whether they are considering pregnancy termination—warn on dangers of unsafe abortion and, where this is safe and legally available and desired by the woman, discuss option of pregnancy termination. Discussion should be non-directive and non-judgmental.
- ❖ Provide family planning counselling and services, to enable them to prevent or delay future pregnancies.

Respond to concerns about sexual function

Advise on prevention of non-sexual spread

- ❖ Do not share needles or razor blades or tattoo instruments (for injecting drug users, encourage needle/syringe exchange and substitution treatment).
- ❖ Cover any open cuts or sores on patient or partner.
- ❖ Protect the caregiver (see section 9, *Caregiver Booklet* and the *Palliative Care module*). Clean up any blood or body fluids with gloves and mild disinfectant.

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11.2 Positive living for PLHA

People with HIV can live full and healthy lives if they take care of themselves and access treatments.

❖ Advise how to prevent other infections

- Avoid STIs and re-infection with other strains of HIV—see prior page.
- Use safe drinking water—drink boiled water or tea when possible. Store water in container which prevents contamination (use spigot; do not dip hand or used cup into water).
- Eat well-cooked food.
- Wash fruits and vegetables (with iodine or chlorine tablets in water, especially for lettuce).
- Avoid others with infections (flu, boils, impetigo, herpes zoster, chickenpox).
- Practice good hand washing—especially after toilet of themselves or others. Caregivers and patient should wash hands often: after using toilet; before preparing food; after sneeze or cough; after touching your genitals; after handling garbage; after touching any blood, semen, vaginal fluid, feces.
- HIV patients should have a local antiseptic (such as gentian violet or chlorhexidine) at home to apply to minor wounds after washing.
- Use insecticide-treated bed net to prevent malaria.

❖ Encourage physical activity as appropriate

- Help patient develop his or her own programme.
- Exercise can make the person feel better and maintain muscle tone.
- Physical activity is important to prevent weight loss:
 - stimulates appetite
 - reduces nausea
 - improves functioning of the digestive system
 - strengthens muscles

❖ Advise to avoid harmful or ineffective expensive treatments or food supplements (locally adapted)

❖ **Support nutrition**

- Advise on nutrition: example from Namibia guidelines (adapt locally)
 - Foods to stimulate weight gain should have high protein, fat, and carbohydrate content and include:

Avocados, coconut, full-cream milk powder, yoghurt or sour milk, soya products, cheese, meat, fish, chicken, peanut butter, nuts and seeds, dried fruit, eggs, beans, lentils, potatoes, sweet potatoes, bananas, olives, cassava, millet, sorghum, oats, rice, barley, wheat, maize.
 - Avoid refined sugar and sweets as these increase the risk of dental and oral problems.
 - Some tips to facilitate adequate intake and digestion of food:

Squeeze fresh lemon juice over fatty foods like meat, chicken and nuts.

Add the grated skin of oranges and lemons to fatty foods.

To help digest meat, eat papaya (paw-paw) with the meat.

Eat many small meals a day and chew food well.

Drink between meals, not with meals.

Eat fermented or sour foods such as sour milk, sour porridge, etc.
 - Avoid excessive alcohol/drugs.

❖ **Address food security: arrange for supplements if available and needed (requires local adaptation):**

- Give priority to patients with weight loss or wasting.
- In certain settings, supplements may be important for treatment adherence especially in first 3 months.

❖ **Have peer demonstrate preparation of nutritious foods**

Annex A: Education and support for all patients at each visit

A.1 Post-test support

- ❖ Provide immediate support after diagnosis.
- ❖ Provide emotional support.
- ❖ Provide time for the result to sink in.
- ❖ Empathize.
- ❖ Use good listening skills.
- ❖ Find out the immediate concerns of the patient and help:
 - Ask: what do you understand this result to mean? (Correct any misunderstandings of the disease).
 - Provide support.
 - What is the most important thing for you right now? Try to help address this need.
 - Tell them their feelings/reactions are valid and normal.
 - Mobilize resources to help them cope.
 - Help the patient solve pressing needs.
 - Talk about the immediate future—what are your plans for the next few days?
 - Advise how to deal with disclosure in the family. Stress importance of disclosure (see H60):
 - Who do you think you can safely disclose the infection to?
 - It is important to ensure that the people who know you are HIV infected can maintain confidentiality. Who needs to know? Who doesn't need to know?
- ❖ Offer to involve a peer who is HIV positive, has come to terms with his or her infection, and can provide help (this is the patient's choice).
- ❖ Advise how to involve the partner (see H60).
- ❖ Make sure the patient knows what psychological and practical social support services are available.
- ❖ Explain what treatment is available.
- ❖ Advise on how to prevent spreading the infection (see H50).
- ❖ Ask patient to come back within 3 days or earlier if needed.

Good Listening Skills

- ❖ Elicit concerns.
- ❖ Listen to feelings.
- ❖ Use good body language.
- ❖ Pauses are good. Be able to be quiet.
- ❖ Do not speak before listening.
- ❖ Understanding is as important as advice.
- ❖ Use empathy.

EMPATHY is feeling with another—tuning in to the feelings of another and responding in a way that the person knows he or she has been heard. Empathy is not the same as sympathy (feeling for another).

- ❖ Tune in to the other person's feelings. Listen to all of the feelings (do not listen selectively).
- ❖ Respond with understanding. Do not try to minimize, change, or "solve" the feelings.
- ❖ When empathizing, do not:
 - judge (evaluate other's feelings)
 - try to fix it (solve the problem)
 - advise (tell them what to do)
 - question (keep seeking more information)

These may be appropriate at other times but not while empathizing.

A.2 Explain what is available for chronic HIV care

- ❖ Explain what is involved in care and how the clinic works.
 - Explain the clinic system for shared confidentiality.
 - Explain who is on the clinical team and that the patient will see more than one health worker.
 - Explain the support available in clinic, home visits, etc.
- ❖ Explain the follow-up schedule (page H48).
- ❖ Explain the basics of HIV infection, transmission and treatments available.
- ❖ Explain what prophylaxis and treatments are available, when they are used and requirements for treatment:
 - ARV therapy
 - Cotrimoxazole prophylaxis
 - INH prophylaxis

A.3 Initiate chronic HIV care (if this is the first visit for chronic care)

ASSESS

- ❖ Patient's goals for today's visit.
- ❖ Understanding of treatments available.
- ❖ Interest in receiving treatment.
- ❖ Readiness for prophylaxis and ART (if indicated).
- ❖ Determine the family circumstance:
 - Where does the patient live? With whom? Is this stable?
 - Has patient disclosed to family?
 - Who else is infected and on care or needs care?
- ❖ Health worker needs to assess patient, clinical stage and develop Treatment Plan.

ADVICE

- ❖ Explain and recommend treatment or prophylaxis (based on nurse or clinician review).
- ❖ Encourage testing of other family members.
- ❖ Explain family care options.

AGREE

- ❖ On Treatment Plan.

ASSIST

- ❖ With adherence to Treatment Plan.
- ❖ Plan home visit, if desired by patient.

ARRANGE

- ❖ Register patient—assign unique HIV care number, start Treatment Card, SmartCard if available (for local adaptation).
- ❖ Make next follow-up appointment (make sure patient knows when and where to go).
- ❖ Arrange home visit as appropriate and feasible.

A.4 Provide Ongoing Support

Provide ongoing education and support appropriate to patient's circumstances. Record on the patient's card.

Types of support needed may change as the patient adjusts to his/her diagnosis and overcomes the first impact of test result. Be prepared to:

❖ **Provide emotional support**

- Empathize with concerns and fears. Provide a secure opportunity for the patient to discuss feelings and to experience feeling understood and accepted by a caregiver.
- Let them know that how they feel is a normal reaction. Learning that others have felt this way can reduce the sense of isolation.

❖ **Assure confidentiality**

❖ **Pay attention to the family setting**

- Help patient understand the social and psychological implications of the positive result for the patient, sexual partner, family, and unborn child (if pregnant or planning pregnancy).
- Help patient find strategies to involve partner and/or extended family members in sharing responsibility.
- Provide support to the family as well as the patient.
- Family care coordination is very important.
- Help plan how to provide for the children. Make sure the child's health is considered (use IMCI guidelines).
- Advise on family planning issues (use Family Planning guidelines).

❖ **Confirm and reinforce (or explain again) information**

- Given during voluntary HIV testing and counselling on maternal to child transmission, possibility of ARV treatment, safer sex, infant feeding, and family planning advice.
- Help patient absorb the information and apply it in his/her own situation.

❖ **Advise how to avoid stigma**

- Discuss to whom to disclose infection (see H60).
- Discuss how ways in which we behave can be interpreted by other people.
- Anticipate that the availability of treatment will help reduce stigma.

Other ways to provide psychosocial support:

❖ Promote use of peer support groups for:

- Patients who have tested HIV positive.
- Couples affected by HIV/AIDS.
- Older children whose parents are positive.
- Groups should be:
 - Led by a social worker and/or woman or man who has come to terms with his or her HIV positive status.
 - Held outside the clinic in order to not reveal the HIV status of the people involved.

Note: Groups are key to psychosocial support. However, they do not replace use of individual support and use of skilled counsellors, when needed.

❖ Connect patient with other existing support services and community resources

- These may include support groups, income-generating activities, religious support groups, orphan care, home care.
- Exchange information for the coordination of interventions.
- Make a coordinated plan for each family involved.
- The health worker and the social worker/community-based worker should establish active linkages with each other and with other existing support organizations—for home-based care and psychosocial support.
- Help patient identify a senior person from the community who will help provide support and care.

❖ Facilitate spiritual counselling for those who want it

- Church or other religious institutions may have specifically prepared counsellors in issues related to HIV/AIDS: death, stigma, illness, planning ahead for care of children, etc.

❖ Refer for individual or couples counselling by community counsellors or professional counsellors, where available

A.5 Discuss disclosure

- ❖ Ask the patient if they have disclosed their result or are willing to disclose the result to anyone.
- ❖ Discuss concerns about disclosure to partner, children, other family, friends.
- ❖ Assess readiness to disclose HIV status and to whom.
- ❖ Assess social support and needs (refer to support groups). See H54.
- ❖ Provide skills for disclosure (role play and rehearsal can help).
- ❖ Help the patient make a plan for disclosure if now is not the time.
- ❖ Encourage attendance of the partner to consider testing and explore barriers.
- ❖ Reassure that you will keep the result confidential.

If the patient does not want to disclose the result:

- ❖ Reassure that the results will remain confidential.
- ❖ Explore the difficulties and barriers to disclosure. Address fears and lack of skills (help provide skills).
- ❖ Continue to motivate. Address the possibility of harm to others.
- ❖ Offer to assist in disclosure (for example, talk with spouse).
- ❖ Offer another appointment and more help as needed (such as peer counsellors or couples counselling).

For women, discuss benefits and possible disadvantages of disclosure of a positive result and involving and testing male partners.

Men are generally the decision makers in the family and communities.
Involving them will:

- Have greater impact on increasing acceptance of condom use, practicing safer sex to avoid infection or avoiding unwanted pregnancy.
- Help to decrease the risk of suspicion and violence.
- Help to increase support to their partners.
- Motivate him to get tested.

Disadvantages of involving and testing the partner: Danger of blame, violence, abandonment.

Health worker should try to counsel the couple together, when possible.

A.6 Prepare for/support adherence to care, prophylaxis, ART

Adherence to care:

- ❖ Help patient arrange to attend follow-up appointments.
- ❖ Follow up missed appointments if stage 2 or higher or on prophylaxis or treatment.

Prophylaxis: prepare for, then support adherence—see section 7

Prepare for ARV therapy, use section 8.7

- ❖ If treatment is not available through clinic, indicate private and other treatment options. Educate on importance of 3 drug treatment (HAART) and dangers of taking only 1 or 2 drugs.

A.7 Support for special circumstances

For woman using replacement feeding for her infant:

- ❖ Discuss strategies to avoid breastfeeding, including issues relating to stigma and family pressure.
- ❖ Help with the practicalities and resources required.
- ❖ Demonstrate and discuss safe preparation and administration of feeds, including volumes and frequency of feeds. If possible, conduct home visits to counsel and support women who are not breastfeeding (see IMCI-HIV Adaptation).

For woman exclusively breastfeeding her infant:

- ❖ Discuss strategies to facilitate exclusive breastfeeding, including issues relating to family pressure, milk supply and demand and coping with a crying infant.
- ❖ Examine breast for signs of poor attachment (sore/cracked nipples, engorgement etc.).
- ❖ Help with correct attachment of infant to the breast.
- ❖ Discuss safe transition to replacement milk (see IMCI-HIV Adaptation).

For older child with HIV-infected parents

Caring for sick parents and siblings has a huge emotional impact on children. Witnessing illness and death of close family members, discrimination and stigma can result in severe depression. Children often are not able to talk about their fears and difficulties.

Children whose parent(s) or other family members are HIV+ need (appropriate to their age):

- ❖ To know what is happening (they often know more than they are told).
- ❖ To know who is responsible for them.
- ❖ To know that they are not expected to take over from their parents.
- ❖ To have support for their fears and emotions (including a peer support group for older children if possible).
- ❖ To receive medical care for their own problems.
- ❖ Legal protection for inheritance rights.
- ❖ Protection from sexual abuse and forced early marriage.
- ❖ Guidance in demanding and accessing social services.
- ❖ To be able to continue to attend school and play with friends.

The family often needs assistance to understand children's needs, how to communicate with and support them, and how to plan ahead for them.

For HIV-infected child

See IMCI-HIV Adaptation

For adolescents

See Adolescent Job Aid

For grandparent caring for children or grandchildren:

- ❖ Pay attention to their own health.

For patient who is terminal

- ❖ Assure good end-of-life care at home.
- ❖ Health worker should provide medical support for palliative care at home (see *Palliative Care* module).
- ❖ Connect to religious support.
- ❖ Help to plan ahead for the children.

Care for health workers and lay providers

B.1 Use universal precautions

- ❖ Use for all patients.
- ❖ When drawing blood:
 - Use gloves.
 - No recapping of needles.
 - Dispose in sharps' box (puncture resistant).
- ❖ Safe disposal of waste contaminated with blood or body fluids.
- ❖ Proper handling of soiled linen.
- ❖ Proper disinfection of instruments and other contaminated equipment.
- ❖ Use protective barriers (gloves, aprons, masks, plastic bags) to avoid direct contact with blood or body fluids.

B.2 Post-exposure prophylaxis

- ❖ Immediately wash with soap and water any wound or skin site in contact with infected blood or fluid, then irrigate with sterile physiological saline or mild disinfectant.
- ❖ Rinse eyes or exposed mucous membrane thoroughly with clear water or saline.
- ❖ report immediately to in charge of PEP and follow local PEP protocol (insert).

B.3 Care for HIV-infected staff

- ❖ Encourage off-site testing for all staff and confidentiality.
- ❖ HIV-positive staff should be supported.
- ❖ Policy on ARV therapy.

B.4 Help staff cope with stigma of caring for patients with HIV/AIDS

B.5 Recognize and prevent burnout

Recognize burnout:

- ❖ Irritability, anger.
- ❖ Poor sleep.
- ❖ Poor concentration.
- ❖ Avoidance of patients and problems—withdrawal from others.
- ❖ Fatigue.
- ❖ Emotional numbing—lack of pleasure.
- ❖ Resorting to alcohol or drugs.
- ❖ In survivors of multiple loss—afraid to grieve.

Prevent and respond:

- ❖ Be confident that you have the skills and resources to care for the patient and family.
- ❖ Define for yourself what is meaningful and valued in care giving.
- ❖ Discuss problems with someone else.
- ❖ Be aware of what causes stress and avoid it.
- ❖ Use strategies that focus on problems, rather than emotions.
- ❖ Change approach to care giving:
 - Divide tasks into manageable parts (small acts of care).
 - Learn how to adjust the pace of caregiving.
 - Ask others to help.
 - Encourage self-care by the patient.
- ❖ Use relaxation techniques.
- ❖ Take care of your life outside of the caregiving (other interests, support, family, friends).
- ❖ Develop your own psychosocial support network (such as caregiver support groups).
- ❖ Take care of your own health.
- ❖ Take time off on a regular basis.
- ❖ Be aware that you can't do everything and need help.
- ❖ Include in your week a time to discuss patients together.
- ❖ Share problems with your colleagues.
- ❖ Organize social events.

HIV CARE/ART CARD

HIV test: When _____ Where _____
Pt No. _____

Name _____ Pt No. _____
Address (in full) _____

Name and address of Treatment Supporter/who can pick up meds if ill _____

Sex: M F Age _____

Status in family:

Children:

For women of childbearing age, pregnancy status (update each visit):

Complication or side effect: N=peripheral neuritis

S = skin rash Z = zoster P = pneumonia J = jaundice De = dementia

F= fever A= anaemia Pa= pancreatitis Di= diarrhoea etc

District HIV careNo. _____
Health Unit _____
District clinician/Team _____

Date ARV Therapy

Transferred in From where:

Start ART first-line: Indication:

Substitute: Discontinue Add

Switch: New regimen _____
Discontinue _____ Add _____

Stop Treatment failure Died

Planned-Very poor adherence Default

Planned– toxicity, complications Drug supply

Planned– patient decision

Transferred out To where:

► Follow-up Education, Support and Preparation for ARV Therapy

	Date/ Comments	Date/Comments	Date/ Comments	Date/ Comments	Date/ Comments
Basic HIV education, transmission					
Prevention: safer sex, condoms					
Prevention: household precautions, what is <u>safe</u>					
Post-test counselling; implications results					
Positive living					
Disclosure, testing partners					
To whom disclosed (list)					
Family/living situation					
Shared confidentiality					
Reproductive choices, prevention MTCT					
Child's blood test					
Progression of disease					
Available treatments/prophylaxis					
Follow-up appointments, clinical team					
CTX, INH prophylaxis					

Adherence preparation	Indicate when READY for ART; DATE/result clinical team discussion	Explain dose, when to take	What can occur, how to manage common side effects	What to do if forgets dose	What to do when travels	Adherence plan (schedule, aids, explain diary)	Treatment buddy preparation	Which doses, why missed	ART support group	How to contact clinic	Symptom management/palliative care at home	Caregiver Booklet	Other home based care	Support groups	Community support
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Chronic HIV Care Acronyms

AIDS	Acquired Immunodeficiency Syndrome
ALT	Alanine Aminotransferase (a liver function test)
AMB	Ambulatory
ARV	Antiretroviral
ART	Antiretroviral Therapy
AZT	Azidothymidine- chemical name for the generic zidovudine (ZDV)
BED	Bedridden
CBOs	Community-Based Organizations
CD4	Count of the lymphocytes with a CD4 surface marker per cubic millimetre of blood
Cm	Centimetre
d4T	Stavudine
EFV	Efavirenz
FBOs	Faith-Based Organizations
GI	Gastrointestinal
HIV	Human Immunodeficiency Virus
IMAI	Integrated Management of Adolescent and Adult Illness
IMCI	Integrated Management of Childhood Illness
INH	Isoniazid
Kg	Kilogram
MD	Medical Doctor
Mg	Milligram
MO	Medical Officer
NGOs	Non-Governmental Organizations
NVP	Nevirapine
OI	Opportunistic Infection
ORS	Oral Rehydration Solution
PLHA	People Living with HIV/AIDS
PMTCT	Prevention of Mother to Child Transmission (of HIV)
PEP	Post-Exposure Prophylaxis
Rx	Treatment
STI	Sexually Transmitted Infection
TB	Tuberculosis
ZDV	Zidovudine
3TC	Lamivudine

